#### SUMMARY

#### S.1 Introduction

This Draft Supplemental Environmental Document (DSED) to the Final Environmental Document (FED), Pacific Herring Commercial Fishing Regulations, 1998, provides the review and analysis required by California Environmental Quality Act (CEQA) Guidelines. The review and analysis was done to assist the California Fish and Game Commission (Commission) in regulating the commercial harvest of Pacific herring throughout the State's ocean and estuarine waters. Specifically, the DSED reviews and evaluates proposed regulatory changes for the 2006-07 fishing season, supplementing, and in some cases replacing, aspects of the proposed project described in the 1998 FED and the Final Supplemental Environmental documents of 1999, 2000, 2001, 2002, 2004, and 2005. A Notice of Preparation (NOP) was used to identify and incorporate concerns and recommendations of the public, resource and regulatory agencies, and the fishing industry into the review and analysis of the proposed changes contained in these documents.

The DSED includes six chapters. Chapter 1 discusses the authorities and responsibilities under which the DSED was developed and describes its intended use. Chapter 2 describes the proposed project and alternatives and options for regulating the commercial harvest of herring. Chapter 3 describes the existing environment where the California herring fisheries occur. Chapter 4 addresses the impacts of the proposed project and cumulative effects. Chapter 5 describes the impacts of the alternatives to the proposed project. Chapter 6 identifies consultations with other agencies, professionals, and the public.

The proposed project has been selected as the preferred alternative based on the analysis of this DSED. The proposed project is identified as the preferred alternative because it provides a set of regulations most likely to achieve the State's CEQA policy with respect to the conservation, sustainability, maintenance, and utilization of the Pacific herring resource.

### S.2 Proposed Project

The proposed project is a body of proposed regulations governing the commercial harvest of herring-for-roe products, the harvest of herring eggs-on-kelp, and the harvest of herring as fresh fish, for bait, and pet food. The proposed project takes the form of recommendations for continuation, amendment, or change to an existing body of regulations in effect since December 2005 (sections 163,163.5, and 164, Title 14, California Code of Regulations [CCR]). It also includes regulations from section 163.1 that were adopted by the Fish and Game Commission on December 10, 2005.

The proposed regulatory changes will establish fishing quotas for San Francisco and Tomales bays for the 2006-07 herring fishing season, based on the most recent assessments of the spawning populations in these locations. Previously established quotas for Humboldt Bay and Crescent City Harbor fisheries are not affected by these regulatory changes. The proposed changes addressed in this document also include provisions for establishing the minimum mesh size as 2-inchs for the roe herring fishery in Tomales Bay.

The specific regulatory changes proposed for the 2006-07 season will:

(1) provide for a 14,505 ton quota, Option 1, for San Francisco Bay (10 percent of the 145,050 ton estimated spawning biomass for the 2005-06 season), a quota of 13,171 tons, Option 2, which represents a reduction in the quota at ten percent by the percentage of three-year old fish (9.2 percent) estimated to comprise the 2005-06 commercial landings, or a quota of 4,502 tons, Option 3, which represents 7.6 percent of the 2004-05 spawning biomass estimate; (2) provide a set 350 ton fishing quota in Tomales Bay (17 percent of the 2005-06 estimated spawning biomass of 3,686 tons); (3) set the dates of the roe herring fisheries in San Francisco Bay from 5:00 p.m. on December 3, 2006 until noon on December 22, 2006. ("DH" gill net platoon only), and 5:00 p.m. on January 2, 2007 until noon on March 9, 2007; (4) set the dates of the roe herring fishery in Tomales Bay from noon on December 26, 2006 until noon on February 28, 2007; (5) provide for the a minimum mesh size of 2 inches for the Tomales Bay fishery; (6) specify that all herring permit applications, transfer fees, authorized agent requests and fresh fish permit

applications be sent to the License and Revenue Branch in Sacramento; (7) amend the maximum number of permits in San Francisco to 80 DH permits and 160 permits for the odd and even platoons; (7) amend regulations to allow vessel signage on the side of the house to be seen from air and eliminate the signage on the top of the wheel house; and (8) modify subsections (a)(5), (b)(1), (c)(1)(D),and (e)(2) of Section 163 regarding crew lists, multiple permit ownership, lottery qualification criteria and gill net vessel fishing for consistency with Section 163.1 of Title 14, CCR.

# S.3 Project Alternatives

Three alternatives are considered in this DSED. These alternatives include: (1) a no-fishery alternative; (2) a no change alternative which uses existing regulations established; and (3) establishing individual vessel quotas for gill net vessels in the roe herring fishery. Refer to Section 2.4, Project Alternatives, and Chapter 5 of this DESD, and Chapter 6 of the 1998 FED, Analysis of Alternatives, for a thorough description of alternatives and analysis of their impacts.

# S.4 Existing Environment

The environments most likely to be affected by the regulatory revisions outlined in this DSED are San Francisco Bay and Tomales Bay. Although the proposed project consists primarily of regulatory changes for San Francisco Bay and Tomales Bay fisheries, the existing environment potentially affected by the proposed project and alternatives also includes the open ocean and other bays in which herring occur. Herring fisheries also occur in the Crescent City Harbor area, Humboldt Bay, and the open ocean, primarily within Monterey Bay. Refer to Section 3.3 of the FED, Specific Biological and Environmental Descriptions, for a thorough description of these environments and Chapter 3 of this document for a description of the environmental setting for these areas.

### S.5 Environmental Impacts

## S.5.1 Proposed Project

An analysis of the potential impacts of the proposed project is described by this DSED. The FED identified the area with the highest potential for adverse impacts associated with the proposed regulatory changes as the San Francisco Bay area, which supports the largest roe herring fishery in the State. The following localized, short-term, and less than significant impacts were identified in the FED for several areas of potential concern including: (1) boat and vehicle traffic circulation; (2) water and air quality; (3) housing and utilities; (4) geology, scenic quality, recreation; and (5) noise. The FED found biological impacts to have the greatest potential for significant environmental impact, but found these impacts to be localized, short-term, and less than significant, with mitigation provided by the current management strategy and Department conducted herring population monitoring. Refer to Chapter 4 of the FED for a thorough environmental impact analysis of the proposed project. Any adverse impacts associated with the regulatory changes proposed by this DSED are addressed within this document.

### S.5.2 Alternatives

The alternatives proposed in this DSED are the same as those described in the FED. A thorough analysis of the impacts of these alternatives is provided in Chapter 6 of the FED. A summary of impacts associated with these alternatives is provided below.

### Alternative 1 (no fishery)

Localized, short-term, and less than significant impacts to vessel and vehicle traffic circulation, water quality, air quality, housing and utilities, scenic quality, recreational opportunities, and noise levels identified for the proposed project would be eliminated or redistributed in an unpredictable manner.

Potential biological impacts associated with a no fishery alternative include an increased rate of natural mortality, the potential for deterioration in the condition of

the herring population as it reaches carrying capacity, and potential impacts to other species that compete with herring for food resources. Although this would be a natural process, adverse temporary impacts would nonetheless be associated with this alternative.

### Alternative 2 (no change)

In most regards, the environmental impacts associated with this alternative would be comparable to those of the proposed project. Although this alternative does provide for an adjustment of quotas and season dates, it does not address certain fishery-related problems considered in amendments or changes to existing regulations. The existing regulation alternative would maintain the herring fishery regulations as amended through 2005 and would not provide for the consistent adaptive management of the State's resources.

# Alternative 3 (individual vessel quota)

As addressed in detail within the FED, individual vessel quotas, rather than the platoon-based quota system currently used in the roe herring gill net fishery, could potentially increase impacts due to an increase in the number of days fished. However, these impacts are still expected to be short-term, localized, and less than significant for most environmental categories.

Wastage of resource could result from sorting catches to remove males from the catch or discarding unripe fish to achieve higher roe content, and therefore, higher ex-vessel prices. However, the competition between permittees for a share of the quota is greatly lessened under an individual quota system and may result in fewer nets likely to be lost, thus reducing impacts from "ghost" net fishing as explained in Section 4.2.6.1 of the FED.

#### S.5.3 Cumulative

An analysis of the cumulative impacts of the proposed project revealed no additional impacts to those addressed in the FED. The proposed regulatory

changes addressed by this DSED are for an existing ongoing project. An analysis of cumulative impacts is provided in Chapter 5 of the FED.

A variety of factors have the capacity to influence Pacific herring population status in California in addition to the proposed project including: (1) biological events; (2) competitive interactions with other pelagic fish and fisheries; (3) oceanographic events; (4) habitat loss; and (5) water quality. However, as with potential impacts from the on-going commercial harvest of herring, continued monitoring of the herring resource and oceanographic conditions should help identify any trends that would signal that the stock's reproductive potential is in jeopardy.

### **S.6 Areas of Controversy**

The following areas of controversy have been identified regarding commercial herring fishing in prior years. Item numbers 1, 2, 4, and 5 of these areas of controversy were addressed in detail within Chapter 4 (Section 4.2.6.2) of the FED. Item number 3 was addressed in the FSED for 2005-06, and Item number 7 is addressed in Chapter 3 of this DESD:

- 1. Importance of herring as a forage species for sea birds, marine mammals, and other fishes:
- 2. Inadequate knowledge of the resource;
- 3. Errors in stock assessment:
- 4. Insufficient management resources;
- 5. Potential impact of unforeseen events or catastrophes (e.g., oil spills, chemical spills);
- 6. Status of the herring population in San Francisco Bay;

#### S.7 Issues to be Resolved

At issue is whether or not to provide for commercial fishing as an element of herring management in California. If commercial herring fishing is authorized, decisions are needed to specify the areas, seasons, fishing quotas and other appropriate special conditions under which fishing operations may be conducted. As

discussed, one aspect of managing this and other fishery resources is the understanding that a no project alternative is considered a management tool. This document, the 1998 FED, the 1999 FSED, the 2000 FSED, the 2001 FSED, the 2002 FSED, the 2004 FSED, and the 2005 FSED include a review and discussion of the proposed project as well as alternatives.